

DETERMINATION OF ANIONS BY ION CHROMATOGRAPHY SM 19 th , 20 th Ed 4110 B					
Relevant Aspect of Standards	Method Reference	Y	N	N/A	Comments
Records Examined: SOP Number/ Revision/ Date _____ Analyst: _____					
Sample ID: _____ Date of Sample Preparation: _____ Date of Analysis: _____					
Are standard anion solutions prepared using salts dried at 105°C and stored in plastic in the refrigerator for a month (after which stability is verified)?	3.d				
If Fluoride is to be analyzed has precision and bias been evaluated to determine the effects of the "water dip" and the simple organic acids which elute close to fluoride?	1.d				
Are working standards prepared fresh daily, stored in plastic and kept away from light?	3.e and f				
Is the ion chromatograph allowed to come to equilibrium (usually 15-20 min) and is the approximate separation in Figure 4110:1 achieved?	4.a				
Are anion retention times determined based on the eluent and column in use?	4.b				
Is a calibration curve using concentration and either peak height or area constructed from the analysis of at least 3 standards (one near the minimum reporting limit)?	4.b				
Is a new calibration curve determined whenever there is a change in the detector setting, eluent or regenerant?	4.b				
When a single standard calibration is used, is the linearity established for a given detector setting? Note: HPO_4^{2-} is nonlinear below 1.0mg/L.	4.b				
When necessary, are sample particulates removed by filtering through a prewashed 0.2µm-pore-diam membrane filter?	4.c				
Notes/Comments:					

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Is a prewashed syringe with a male luer fitting used to flush the sample through the loop several times?	4.c				
Was the ion chromatograph switched from load to inject mode, the peak heights and retention times recorded on a strip chart recorder?	4.c				
Are successive samples injected after the last peak has appeared and the conductivity signal has returned to baseline ?	4.c				
Are samples concentrations calculated using against their appropriate calibration curve or the following equation (when responses are shown to be linear)? C=H x F x D C=mg anion/L H=peak height or area F=response factor D=dilution factor (when required)	5				
Notes/Comments:					